	Table ES-7 Summary of Potentially Significant Environmental Effects			
Impact	Significance Before Mitigation		Significance After Mitigation	
		Section 3.1 - Biological Resources	_	
PROPOSED PROJECT	<b>T</b>		T	
Vegetation Impact 1: Permanent Loss of Vegetation Communities	LS	<ul> <li>Vegetation Impact 1 Mitigation: The following would be implemented to reduce construction disturbances and maximize recovery of vegetation communities.</li> <li>During construction, travel would be restricted along the existing access roads and spur roads to the shortest feasible path to minimize impacts to vegetation communities.</li> <li>Existing access roads would be used to the maximum extent allowable, and construction of new access and spur roads would be limited to the extent practicable.</li> <li>Vegetation removal would be minimized wherever possible and would be restricted in sensitive resource areas (e.g., areas with erodible soils and designated areas of critical environmental concern).</li> <li>To the extent possible, grading and scrubbing of vegetative cover shall be avoided on all spur roads and tower pad locations, and all vehicular traffic shall drive within field designated overland routes.</li> </ul>	LS	
Vegetation Impact 2: Possible Introduction or Dispersal of Noxious Weeds	S	<ul> <li>Vegetation Impact 2 Mitigation: The following prescriptions would prevent the spread of invasive weeds into previously uninfested areas in the designated construction right-of-way.</li> <li>Prior to initiating construction activities, all clearing and grading equipment would have the tires, axels, frame, running boards, under carriages, and soil holding areas washed and cleaned at a designated station to prevent noxious weed species transport to unaffected areas.</li> <li>A qualified weed specialist, range ecologist, or arid botanist would survey the tower pad locations, stringing and tensioning sites, new spur road sites, existing access roads that require improvements, and construction material staging areas prior to construction to identify any listed noxious species infestations. If an infestation is identified, the infestation area would be clearly delineated and staked prior to project construction and an appropriate buffer would be maintained. The lead environmental compliance monitor would ensure that construction-related activities would be prohibited within these designated exclusion zone(s). Where avoidance is infeasible, please refer to measures listed below.</li> <li>Before beginning construction activities in unavoidable infestation exclusion zones, these infestations would be controlled through acceptable mechanical (e.g., topsoil excavation and removal), cultural, or herbicide applications.</li> <li>If direct control methods or removal of noxious weed infestations in construction disturbance areas is not feasible, the noxious plants may be cut and disposed of (e.g., burned at an acceptable and permitted location) or destroyed in a manner that is acceptable to the BLM.</li> <li>The lead environmental construction monitor would educate construction personnel on noxious weed identification and the legal requirement of controlling and preventing the spread of noxious weed infestations.</li> </ul>	LS	

Table ES-7			
	Sumr	nary of Potentially Significant Environmental Effects	
	Significance		Significance
Impact	Before	Mitigation Measures	After
	Mitigation		Mitigation
Vegetation Impact 3: Possible Removal or Disturbance of Riparian Communities	8	<ul> <li>Vegetation Impact 3 Mitigation: The following actions and all permit conditions detailed within the COE Nationwide 12 permit (subject to separate approval) would be implemented by the construction manager and environmental compliance monitor(s).</li> <li>Before construction, qualified resource specialists would stake and flag or fence exclusion zones around all identified riparian woodlands. Such exclusion zones would include a 10-foot buffer to preclude sediment intrusion into the riparian areas. Earth-moving activities would be restricted from these zones, although essential vehicle operation and foot travel would be permitted on existing roads, bridges, and crossings. All other construction activities, vehicle operation, material and equipment storage, and other surface-disturbing activities would be prohibited within the exclusion zone.</li> <li>In areas where riparian habitats are unavoidable, the construction manager in consultation with the lead environmental compliance inspector would narrow the width of the centerline to the maximum extent allowable. New spur roads and existing access roads improvements would be constructed and implemented using methodology that preserve existing hydrology. Tower pad clearance would be minimized to the maximum extent allowable.</li> <li>All temporarily disturbed riparian areas that would not be utilized for future routine operation and maintenance activities would be restored to ensure no net loss of habitat functions and values. Following construction activities, the areas would be restored as soon as practicable and the activities described in the Reclamation Plan would be implemented.</li> <li>Permanent, unavoidable losses of riparian areas would be mitigated by restoration and/or preservation on off-site habitats. The final mitigation acreage ratios and off-site restoration sites would be determined by the responsible agency(s) and would be conditioned through final permitting activities.</li> </ul>	
Wildlife Impact 1:	LS	Wildlife Impact 1 Mitigation: Compensate for habitat modifications per coordination with responsible resource	LS
Temporary and Permanent Loss of Wildlife		agencies.	
Habitat and Habitat Fragmentation			

Table ES-7			
		nary of Potentially Significant Environmental Effects	
	Significance		Significance
Impact	Before	Mitigation Measures	After
TYPE IN A SECOND	Mitigation	Will was a state of the state o	Mitigation
Wildlife Impact 2: Direct Wildlife Mortality and Temporary Displacement of Wildlife	LS	<ul> <li>Wildlife Impact 2 Mitigation: Construction activities and vehicle operation would be conducted to minimize potential disturbance of wildlife.</li> <li>Limit speed of vehicles along the right-of-way and access roads to 15 to 20 mph in sensitive habitats. In addition,</li> </ul>	LS
		construction and maintenance employees would also be advised that care should be exercised when commuting to and from the project area to reduce road mortality.	
		<ul> <li>Prohibit vehicle operation off the right-of-way by construction workers, including construction work and employee access, except where specified by the landowner or land management agency or where roads already exist.</li> <li>Stockpiling of equipment and parking of vehicles would be undertaken to the maximum extent allowable on</li> </ul>	
		previously disturbed areas proximate to the construction zone.	
		• Construction activities would attempt to utilize the minimum number and types of vehicles and equipment necessary on the right-of-way.	
		• If feasible, and where appropriate, construction activities may be scheduled to avoid critical life stages of the desert mule deer.	
Wildlife Impact 3: Potential Hazard for Raptor Species	LS	<ul> <li>Wildlife Impact 3 Mitigation: Design incorporation would minimize electrocution and collision potential.</li> <li>Current construction practices for major transmission systems now space conductors and ground wires sufficiently apart so that raptors, including bald eagles, the largest of the raptors, cannot contact two conductors or one conductor and a ground wire to cause electrocution. In addition, the conductor spacing for the 230-kV and 500-kV transmission lines would be a minimum of 20 feet and 35 feet, respectively. Both of these conductor spacing distances are significantly greater than the minimum distance that could result in simultaneous wing contact (e.g., the APLIC report shows that the wingspan of a bald eagle is from 6 feet 6 inches to 7 feet 6 inches; perched, a large raptors wing would reach out 39 inches to 51 inches).</li> <li>Collision potential with the proposed transmission line has been minimized through placement and siting of the new transmission line within a corridor that has existing facilities which provide additional visual cues that often prompt birds to gain altitude and fly over the line.</li> </ul>	LS
Wildlife Impact 4: New Access Roads Could Increase Disturbance to Resident Wildlife Species	S	<ul> <li>Wildlife Impact 4 Mitigation: Restrict public access.</li> <li>During construction activities, exclusionary fencing via temporary and/or permanent construction barricades, fences with locked gates (at road intersections) and/or sign posting would be utilized, where necessary, to restrict public access in designated Wildlife Management Areas, National Wildlife Refuges, and designated critical areas by the responsible agencies. These barriers would be maintained by the applicant throughout the construction phase.</li> <li>In addition, temporary constructed spur roads that travel through sensitive or designated management areas would be reclaimed to preclude unauthorized overland vehicle access.</li> </ul>	LS

	Table ES-7 Summary of Potentially Significant Environmental Effects			
Impact	Significance Before Mitigation	Mitigation Measures	Significance After Mitigation	
Wildlife Impact 5: Potential Habitat Disturbance for Nesting Raptors and Migratory Birds	S	<ul> <li>Wildlife Impact 5 Mitigation: Conduct pre-construction surveys prior to project initiation.</li> <li>Prior to project construction activities, it would be determined whether any tree or shrub removal or clearing shall occur during the passerine and raptor nesting season (e.g., April 1 to August 31). If tree or shrub removals occur during the nesting season, a qualified biologist would conduct a focused survey for nests during the nesting season to identify any active nests in the Proposed Project disturbance areas. The survey shall be conducted no less than 14 days and no more than 30 days prior to the beginning of construction and subsequent tree or shrub removal. If nesting passerine or raptors are found during the focused survey, no construction or tree removal would occur within 500 feet of an active nest until the young have fledged (as determined by a qualified biologist). If nest trees are unavoidable, they would be removed only during the non-breeding season. If construction activities do not require any tree or shrub removal or clearing during the nesting season, no further mitigation would be necessary.</li> </ul>		
Special-Status Species Impact 1: Possible Disturbance of Special-Status Plants	S	<ul> <li>Special-Status Species Impact 1 Mitigation: Survey and avoid and/or salvage special-status species plants.</li> <li>A comprehensive focused survey designed with appropriate agency consultation would be conducted prior to construction and project-related activities to identify any new special-status plant populations on proposed tower pads, spur roads, pulling and splicing sites, staging areas, or any other construction sites that would be temporarily or permanently disturbed.</li> <li>If special-status plant(s) are identified during the pre-construction surveys, vegetation communities and plant locations would be delineated on aerial photography and incorporated into the COM Plan. In addition, exclusion zones would be marked around identified populations prior to construction. These designated exclusion zones would be marked in the field with stakes and flagging, and all construction-related activities would be prohibited within these zones, including vehicle operation, material and equipment storage, and other surface-disturbing activities. Where feasible, minor realignments would be implemented to avoid those populations within the designated tower pad and spur road locations.</li> <li>Where avoidance is infeasible, a Plant Salvage Plan would be developed and submitted for approval from the appropriate responsible agencies. It is envisioned that the identified special-status plants would be hand salvaged and planted in an adjacent, undisturbed site.</li> </ul>		

Table ES-7			
	Sumr	nary of Potentially Significant Environmental Effects	
Impact	Significance Before Mitigation	Mitigation Measures	Significance After Mitigation
Special-Status Species Impact 2: Potential Direct Impacts to Desert Tortoise	S	<ul> <li>Special-Status Species Impact 2 Mitigation: Implement measures to decrease the likelihood of incidental take of desert tortoise and habitat mitigation</li> <li>Impacts to 495 acres of temporary disturbance and 25 acres of permanent disturbance associated with 500-kV option or 428 acres of temporary disturbance and 21 acres of permanent disturbance associated with 500-kV option. Category I desert tortoise habitats would be compensated at ratios calculated using the formulas detailed in USFWS (2002b) Biological Opinion for the CDCA Plan. In addition, (and dependent upon final selection of the 230-kV or 500-kV option) the above listed acreages would be added to the BLM administered database for the cumulative one percent total disturbance for the Chuckwalla Desert Wildlife Management Area (DWMA).</li> <li>Only biologists with authorized USFWS permits shall handle desert tortoises.</li> <li>All handling of desert tortoises and their eggs, relocation of desert tortoises, and excavation of burrows shall be conducted by an authorized biologist in accordance with the USFWS and/or BLM recommended protocol.</li> <li>Only biologist(s) approved or authorized by the USFWS shall conduct pre-project clearance surveys for the desert tortoise or monitor project activities for compliance with any proposed protective measure issues in the Section 7 consultation.</li> <li>BLM shall submit the name(s) and credentials of the proposed project biologist(s) to the USFWS for review and approval at least 30 days prior to the onset of construction activities. No activities shall begin until a biologist(s) is approved by the USFWS.</li> <li>Approximately 50 miles of the transmission alignment would overlap USFWS designated desert tortoise critical habitat. In order to comply with Section 9 of the FESA, a formal Section 7 consultation with USFWS would be required for potential impacts to desert tortoise, and their designated critical habitat. In addition, a 2081 permit or Consistency Determination from the CDFG would also be requ</li></ul>	LS
Special-Status Species Impact 3: Increased Raven Predation on Desert Tortoises	S	<ul> <li>Special-Status Species Impact 3 Mitigation: Implement measures to decrease raven populations.</li> <li>The BLM would participate in regional passive and active raven depredation control programs in or within 1 mile of desert tortoise habitat.</li> <li>Design and operation features would be consistent with adopted land use plans.</li> <li>All litter and debris shall be promptly removed and deposited in permitted landfills by the construction contractor.</li> </ul>	LS

Table ES-7 Summary of Potentially Significant Environmental Effects			
Impact	Significance Before Mitigation	Mitigation Measures	Significance After Mitigation
Special-Status Species Impact 4: Loss of Wildlife Habitat and Direct Mortality to the Coachella Valley Fringe-toed Lizard	S	<ul> <li>Special-Status Species Impact 4 Mitigation: Implement measures to decrease the likelihood of incidental take of Coachella Valley fringe-toed lizard and habitat mitigation.</li> <li>The Applicant would implement a Worker Environmental Awareness Program that details specific life history and graphic demonstrations of the Coachella Valley fringe-toed lizard.</li> <li>To the extent possible, construction in Coachella Valley fringe-toed lizard habitat would be limited to the inactive season for the fringe-toed lizards, which is typically May through July. If construction operations occur outside this time period within suitable habitat of the Coachella Valley fringe-toed lizard, it should occur when the air temperature range and be able to avoid crushing by vehicles and personnel.</li> <li>Pre-construction surveys for Coachella Valley fringe-toed lizard shall be conducted in areas of blows and habitat, including the blows and areas within the Coachella Valley National Wildlife Refuge and adjacent to Dillon Road. The pre-construction surveys would be conducted within 24 hours of ground disturbance and any individuals found would be captured and relocated to a USFWS/CDFG approved area.</li> <li>To reduce direct impacts to fringe-toed lizards during construction, a qualified biologist would monitor all ground-disturbing activities in Coachella Valley fringe-toed lizard habitat. The monitor(s) would be present throughout construction and restoration activities in Coachella Valley fringe-toed lizard habitat to identify, salvage, and relocate any individuals to the nearest suitable habitat. The preferred method of relocation is to allow the animals to move out of the area on their own, but active removal by hand, snake stick or other non-lethal means may be necessary.</li> <li>All construction activities shall be restricted to designated work areas, with all vehicle use occurring only on existing, designated roads. Any spoils should be stockpiled in previously disturbed areas, which have b</li></ul>	LS

Table ES-7				
	Summary of Potentially Significant Environmental Effects			
Impact	Significance Before Mitigation	Mitigation Measures	Significance After Mitigation	
Special-Status Species Impact 5: Loss of Wildlife Habitat and Direct Mortality to the Flat-tailed Horned Lizard and Colorado Valley Fringe-toed Lizard	S	<ul> <li>Special-Status Species Impact 5 Mitigation: Implement measures to decrease the likelihood of incidental take of flattailed horned lizard and Colorado fringe-toed lizard.</li> <li>Implement a worker education program.</li> <li>Flag or otherwise mark the outer boundaries of the project construction areas where necessary to define the limit of work activities.</li> <li>Minimize habitat degradation within sand dunes by limiting travel to existing roads and surface disturbance to previously disturbed areas.</li> <li>A monitor would be required to remove flat-tailed horned or Colorado Desert fringe-toed lizards in this segment of the right-of-way. Pulling, staging, and equipment storage sites in this segment, where construction activities would be intense and extended over time, may be temporarily fenced with a lizard-proof fence (e.g., 0.5 inch mesh, buried), surveyed prior to construction and cleared of all flat-tailed horned and Colorado Desert fringe-toed lizards. If unfenced (e.g., tower pads), construction activities may require monitoring to assist in removal of all flat-tailed horned and Colorado Desert fringe-toed lizards. Specific removal and translocation criteria are defined in Foreman (1997). The surveying biologist must be familiar with flat-tailed horned and Colorado Desert fringe-toed lizard behavior and habitat associations and approved by CDFG.</li> <li>Additionally, where flat-tailed horned and Colorado Desert fringe-toed lizards are found, compensation may be required for acreage that is disturbed or lost due to project construction or operation. If lack of occupation can be reasonably demonstrated, no compensation is required and mitigation measures described above can be decreased accordingly.</li> </ul>		
Special-Status Species Impact 6: Potential Impacts to the Desert Rosy Boa	S	<ul> <li>Special-Status Species Impact 6 Mitigation: Implement measures to decrease the likelihood of incidental take of desert rosy boa.</li> <li>To avoid construction-related mortalities of desert rosy boa, it is recommended that construction in or near rocky areas be conducted during daylight hours. This species is nocturnal and individuals can be avoided during daytime construction. Project construction activities would take place only during daylight hours; therefore, no additional mitigation measures are necessary.</li> </ul>		
Special-Status Species Impact 7: Potential Impacts to Couch's Spadefoot	S	<u>Special-Status Species Impact 7 Mitigation:</u> Identify and avoid ephemeral pools containing Couch's spadefoot larvae.	LS	

Table ES-7			
	Sumr	mary of Potentially Significant Environmental Effects	
Impact	Significance Before Mitigation	Mitigation Measures	Significance After Mitigation
Special-Status Species Impact 8: Potential Impacts to Burrowing Owls	S	<ul> <li>Special-Status Species Impact 8 Mitigation: Implement measures to decrease the likelihood of incidental take of burrowing owls.</li> <li>Conduct pre-construction surveys to identify occupied burrows. If owls are present on the project site, CDFG would be consulted to determine the best method for minimizing disturbance. If owls are present, and nesting is not occurring, owls may be removed via a CDFG-approved passive relocation method. Owl removal is recommended between September 1 and January 31, to avoid disruption of breeding activities. During the nesting season (February 1 through August 31), if nesting owls are discovered within the construction right-of-way, CDFG would be consulted to determine adequate nest buffers until fledging has occurred. Following fledging, owls may be passively relocated.</li> <li>If any active burrows are damaged by construction activities, CDFG would be consulted to determine off-site compensation for loss of occupied habitat. Generally, compensation lands for desert tortoise may apply to burrowing owl compensation.</li> <li>Unoccupied burrows identified within the construction right-of-way during the pre-construction surveys would be collapsed or excavated prior to construction activities to prevent owl occupancy.</li> <li>If artificial burrows are installed to minimize the effect of burrow loss, they would be placed within the home range of individual owls affected prior to burrow excavation or installment of one-way doors.</li> <li>If active burrows (e.g., eggs or fledglings) are discovered during the breeding season within the construction work area, construction activities would be curtailed within a 250 foot buffer area until the young have left the burrow (CDFG Staff Report on Burrowing Owl Mitigation, 1995).</li> </ul>	LS
Special-Status Species Impact 9: Impacts to Nesting Loggerhead Shrike, LeConte's Thrasher, and Black-tailed Gnatcatcher	S	<ul> <li>Special-Status Species Impact 9 Mitigation: Implement measures to decrease the likelihood of destruction of active loggerhead Shrike, LeConte's Thrasher, and black-tailed gnatcatcher nests.</li> <li>Removal of nesting substrate (e.g., trees and shrubs) would be performed outside the active breeding season for each of the three species, typically April 1 to August 15. If this is not feasible, a pre-construction survey, in conjunction with the focused special-status plant surveys, would be conducted on potential disturbance areas to identify any active nests.</li> <li>If an active nest(s) are found and construction would occur within 250 feet, BLM's Compliance Inspector would consult with CDFG and/or USFWS to determine the most appropriate preventive action. It is envisioned that two scenarios are available for construction to proceed:         <ul> <li>(a) Construction would be postponed within 250 feet of active nests until a qualified biologist determines that the young have fledged; or</li> <li>(b) The applicant secures written authorization from CDFG to proceed with construction. CDFG may require that the nest(s) be continually monitored while construction continues to determine if such activities may result in adults abandoning the eggs or hatchlings and agrees to abide by any conditions.</li> </ul> </li> </ul>	LS
Special-Status Species Impact 10: Impacts to Prairie Falcon	LS	Special-Status Species Impact 10 Mitigation: Implement measures to decrease the likelihood of incidental take of prairie falcon.	LS
Special-Status Species Impact 11: Impacts to Chuckwalla	S	Special-Status Species Impact 11 Mitigation: Implement measures to decrease the likelihood chuckwalla mortality.	LS

Summary of Potentially Significant Environmental Effects			
Impact	Significance Before Mitigation	Mitigation Measures	Significance After Mitigation
Special-Status Species Impact 12: Impacts to Coachella Valley Round-tailed Ground Squirrel	S	<u>Special-Status Species Impact 12 Mitigation:</u> Implement measures to decrease the likelihood of Coachella Valley round-tailed ground squirrel mortality.	LS
Waters of the U.S. Impact 1: Possible Short-term Disturbance of Other "Waters of the U.S."	S	<ul> <li>Waters of the U.S. Impact 1 Mitigation: The following actions and all permit conditions issued within the COE Nationwide Permit would be implemented by IID's construction contractor. BLM's Compliance Inspector and IID's Environmental Compliance Monitor(s) would routinely inspect construction activities to verify that these measures and permit conditions have been implemented.</li> <li>Upon completion of the final engineering design including tower structure placement via surveying, a "waters of the U.S." survey would be completed and submitted to the COE. It is envisioned that a Nationwide 12 Permit would be required prior to project construction activities.</li> <li>Consistent with the COE's Nationwide Permit No. 12 for utility line discharges, the area of "waters of the U.S." to be disturbed would be limited to the minimum area necessary to successfully install the transmission line.</li> <li>Spur roads and tower pad placement through arboreal arid washes would be minimized during the design engineering to the maximum extent allowable. Where such facilities are infeasible outside identified washes,</li> </ul>	LS

Table ES-7

## ALTERNATIVE A

Alternative A would result in similar direct and indirect impacts on biological resources as the Proposed Project. Corresponding mitigation measures are expected to be sufficient to reduce potentially significant impacts to a less than significant level.

condition and reduces the effects of erosion on the drainage system.

areas in order to ensure minimum habitat disturbance.

habitat disturbance and tree removal would be minimized. These identified washes would be flagged prior to disturbance by a qualified resource specialist, and all construction activities would take place inside designated

"Waters of the U.S." would be restored in a manner that encourages vegetation to reestablish to its pre-construction

Additional compensatory, restoration, or avoidance mitigation measures may be identified by regulatory agencies

(e.g., COE, USFWS) as part of the permitting process and would be implemented into the COM.

## ALTERNATIVE B

Alternative B would result in similar direct and indirect impacts on biological resources as the Proposed Project. Corresponding mitigation measures are expected to be sufficient to reduce potentially significant impacts to a less than significant level.

## ALTERNATIVE C

Alternative C would result in similar direct and indirect impacts on biological resources as the Proposed Project. Corresponding mitigation measures are expected to be sufficient to reduce potentially significant impacts to a less than significant level.

Table ES-7			
Impact	Significance Before Mitigation	mary of Potentially Significant Environmental Effects  Mitigation Measures	Significance After Mitigation
		Section 3.2 – Cultural Resources	
PROPOSED PROJECT			
Cultural Resources Impact 1: Could Result in Direct Effects to Prehistoric and Historic Archaeological Sites	S	Cultural Resources Impact 1 Mitigation: Preparation of a Treatment Plan for avoiding and mitigating unavoidable direct adverse effects on resources eligible for National Register listing will be prepared and implemented.  • Treatment of cultural resources will follow the procedures established by the ACHP for compliance with Section 106 of the NHPA and also for compliance with CEQA. A Treatment Plan will be prepared to identify methods of avoiding or mitigating effects. Prior to that, a pedestrian inventory will be undertaken of all portions that have not been previously surveyed or identified by BLM as requiring inventory to identify properties that are eligible for the NRHP (and de facto, the CRHR). Those sites not already evaluated for NRHP eligibility will be evaluated based on surface remains, subsurface testing, archival and ethnographic sources, and in the framework of the historic context and important research questions of the Project Area. Sites determined not eligible will receive no further treatment. A cultural resources evaluation report will be submitted to BLM for review, and for consultation purposes, as part of the development of the Treatment Plan.	
Cultural Resources Impact 2: Could Result in the Discovery of Previously Unknown Prehistoric and Historic Resources	S	<u>Cultural Resources Impact 2 Mitigation:</u> Designate a cultural resources specialist to be available to address discovered resources.	LS
Cultural Resources Impact 3: Could Affect Resources Within Sensitivity Zones	S	Cultural Resources Impact 3 Mitigation: Implement Cultural Resources Impact 1 Mitigation.	LS
Cultural Resources Impact 4: Construction Activities and Disturbance, and the Placement of Project-Related Facilities Could Adversely Affect TCPs	S	Cultural Resources Impact 4 Mitigation: Consult with Native American Groups.	LS

#### ALTERNATIVE A

Alternative A would result in similar direct and indirect impacts on cultural resources as the Proposed Project. Corresponding mitigation measures are expected to be sufficient to reduce potentially significant impacts to a less than significant level.

## ALTERNATIVE B

Alternative B would result in similar direct and indirect impacts on cultural resources as the Proposed Project. Corresponding mitigation measures are expected to be sufficient to reduce potentially significant impacts to a less than significant level.

## ALTERNATIVE C

Alternative C would result in similar direct and indirect impacts on cultural resources as the Proposed Project. Corresponding mitigation measures are expected to be sufficient to reduce potentially significant impacts to a less than significant level.

Table ES-7 Summary of Potentially Significant Environmental Effects			
Impact	Significance Before Mitigation	Mitigation Measures	Significance After Mitigation
		Section 3.3 - Air Quality	
PROPOSED PROJECT	~		
Air Impact 1: Significant Exhaust and Fugitive Dust Emissions	S	<ul> <li>Air Impact 1 Mitigation: The following mitigation measures would be implemented during the construction of the Proposed Project to reduce the exhaust emissions of CO, NOX, VOC, SOX, and PM10:</li> <li>Heavy duty off road diesel engines will be properly tuned and maintained to manufacturers' specifications to ensure minimum emissions under normal operations;</li> <li>Visible emissions from all heavy duty off road diesel equipment shall not exceed 40 percent opacity for more than three minutes in any hour of operation;</li> <li>A comprehensive inventory (i.e. make, model, year, emission rating) of all heavy-duty off-road equipment (50 horsepower or greater) that will be used an aggregate of 40 hours per week or more during the duration of the construction project will be submitted to the Districts.</li> <li>Within Coachella Valley, measures would be implemented to protect blow sand areas from compaction, including not using chemical dust suppressants.</li> <li>Due to the remote locations, dry desert environment, and unique wildlife hazard issues specific to the project region, a combination of both water and chemical dust suppression would be utilized. Controlling dust in the desert is further complicated by the fact that water is an attractant to desert wildlife including the endangered Desert Tortoise. The use of petroleum and related products create potential soil and water pollution in sensitive desert environments.</li> <li>Water will be used for dust suppression when reasonably available and when water will not create wildlife hazard in construction zones. In cases where water is not feasible, chemical dust suppression methods, such as organic polymers or wood derivative compounds, will be implemented when dust suppression is warranted. These compounds will be applied as needed but are expected to require limited application.</li> <li>The following mitigation measures would be implemented for the Proposed Project to reduce emission fugitive dust (including PM10):</li> <li>Apply water or chemical du</li></ul>	LS

	Sumr	Table ES-7 nary of Potentially Significant Environmental Effects	
Impact	Significance Before Mitigation	Mitigation Measures	Significance After Mitigation
		these identified above the Proposed Project, and mitigation measures identified for the Proposed Project would also be ap	propriate for
ALTERNATIVE B Air Quality impacts associated with Alternative B Alternative B impacts. Mitigation measures are exALTERNATIVE C Air Quality impacts associated with Alternative C	are similar to pected to be are similar to	sufficient to reduce potentially significant impacts to a less than significant level.  these identified above the Proposed Project, and mitigation measures identified for the Proposed Project would also be apsufficient to reduce potentially significant impacts to a less than significant level.  these identified above the Proposed Project, and mitigation measures identified for the Proposed Project would also be apsufficient to reduce potentially significant impacts to a less than significant level.	
The state of the s	<u> </u>	Section 3.4 – Water Resources	
PROPOSED PROJECT			
Water Impact 1: Construction activities could result in a discharge of hazardous materials into a watercourse or wash.	S	<ul> <li>Water Impact 1 Mitigation: A SWPPP would be prepared as required by the State Water Resources Control Board's General Construction Activity Storm Water Permit. The SWPPP shall include:</li> <li>An outline of the areas of vegetative soil cover or native vegetation onsite that will remain undisturbed during the construction project.</li> <li>An outline of all areas of soil disturbance including cut or fill areas which will be stabilized during the rainy season by temporary or permanent erosion control measures, such as seeding, mulch, or blankets, etc.</li> <li>An outline of the areas of soil disturbance, cut, or fill which will be left exposed during any part of the rainy season, representing areas of potential soil erosion where sediment control BMPs are required to be used during construction.</li> <li>A proposed schedule for the implementation of erosion control measures.</li> <li>(a) The SWPPP shall include a description of the BMPs and control practices to be used for both temporary and permanent erosion control measures.</li> <li>(b) The SWPPP shall include a description of the BMPs to reduce wind erosion at all times, with particular attention paid to stockpiled materials.</li> <li>In addition, the SWPPP would include spill prevention and control measures including:</li> <li>(a) Minimize on-site use of hazardous materials and use materials with the lowest toxicity practicably available.</li> <li>(b) Refuel and maintain of vehicles and equipment only in designated areas that are either bermed or covered with concrete or asphalt to control potential spills.</li> <li>(c) Conduct refueling only with approved pumps, hoses, and nozzles.</li> <li>(d) Service and maintenance of vehicles and equipment will be conducted only by authorized personnel.</li> <li>(e) Place catch-pans under equipment to capture potential spills during servicing.</li> <li>(f) Place all disconnected hoses in containers to collect residual fuel from the hose.</li> <li>(g) Shut down vehicle engines during refueling.</li> <li>(h) No</li></ul>	LS

		Table ES-7	
	Sumn	nary of Potentially Significant Environmental Effects	
Impact	Significance Before Mitigation	Mitigation Measures	Significance After Mitigation
		<ul> <li>(k) Provide service trucks with fire extinguishers and spill containment equipment, such as absorbents.</li> <li>(l) Should a spill contaminate soil, place the soil in containers and dispose of as a hazardous waste.</li> <li>(m) Inspect all containers used to store hazardous materials at least once per week for signs of leaking or failure. All maintenance and refueling areas will be inspected monthly. Results of inspection will be recorded in a logbook that will be maintained on-site.</li> </ul>	
Water Impact 2: Construction activities could result in discharges of sediments into watercourses creating turbidity.	S	<ul> <li>Water Impact 2 Mitigation: A SWPPP will be prepared as required by the State Water Resources Control Board's General Construction Activity Storm Water Permit.</li> <li>The SWPPP would include the following measures:</li> <li>Minimize soil disturbances within a watercourse or potential watercourse channels.</li> <li>If disturbance of a watercourse or potential watercourse is necessary, perform all construction activities when flows in the channel are low or during months when rainfall is minimal.</li> <li>After construction activities have been completed in an area, appropriately spread or stabilize the exposed or stockpiled soil to prevent entrainment during a discharge event.</li> <li>Prepare and implement a Reclamation Plan (see Appendix F).</li> </ul>	
Water Impact 3:  Wells and springs adjacent to construction areas could be disturbed or contaminated.	S	<ul> <li>Water Impact 3 Mitigation:</li> <li>Surveys of the route will be conducted prior to construction to identify springs and their well depths, flow conditions, and hydrogeologic relationships within 1,000 feet of construction activities. This survey will also include assessing sensitive endemic species located near these wells and springs. Construction activities will be limited in the following manner: (1) construction activities will not be carried out within 100 feet of a well without using BMPs; (2) blasting will be prohibited within 500 feet of a well; and (3) only size limited blasting will be authorized within 1,000 feet of a well. If damage occurs to a well or spring, the affected area will be repaired by the contractor.</li> <li>The use or storage of hazardous material near a well or spring will be prohibited. Additionally, special precautions will be implemented to prevent spills of hazardous materials, discharges of foreign materials, and sedimentation discharges near a well or spring.</li> <li>Dewatering activities for tower footings or other deep excavations will be planned to minimize the effect on wells and springs.</li> </ul>	
Water Impact 4: Tower placement may occur in areas subject to flood events which could result in damage and risk of failure of project facilities.	S	<ul> <li>Water Impact 4 Mitigation:         <ul> <li>The placement of a tower in an alluvial fan where it emerges at a canyon mouth and at the front of a mountain should be avoided. Locating structures near watercourses or washes with sizable catchments in nearby mountains which are generally prone to flash floods should be avoided. Historical review and interviews with knowledgeable individuals or groups about past flash flooding events in the area should be undertaken.</li> </ul> </li> <li>If placement of a tower in an area described in a, above, cannot be avoided, a geotechnical engineer should be consulted regarding the design of the tower at risk locations.</li> </ul>	

Table ES-7 Summary of Potentially Significant Environmental Effects				
Impact	Significance Before Mitigation	Mitigation Measures	Significance After Mitigation	
Water Impact 5: Use of water during construction could deplete available resources.	LS	Not Required	LS	

#### **ALTERNATIVE A**

Water Resources impacts associated with Alternative A are similar to these identified above the Proposed Project, and mitigation measures identified for the Proposed Project would also be appropriate for Alternative A impacts. Mitigation measures are expected to be sufficient to reduce potentially significant impacts to a less than significant level.

## ALTERNATIVE B

Water Resources impacts associated with Alternative B are similar to these identified above the Proposed Project, and mitigation measures identified for the Proposed Project would also be appropriate for Alternative B impacts. Mitigation measures are expected to be sufficient to reduce potentially significant impacts to a less than significant level.

## ALTERNATIVE C

Water Resources impacts associated with Alternative C are similar to these identified above the Proposed Project, and mitigation measures identified for the Proposed Project would also be appropriate for Alternative C impacts. Mitigation measures are expected to be sufficient to reduce potentially significant impacts to a less than significant level.

# Section 3.5 – Geology and Soils

#### PROPOSED PROJECT Geology and Soils Impact 1: LS **Geology and Soils Impact 1 Mitigation:** Construction of Proposed Project facilities IID will retain a qualified engineering geologist to evaluate the potential for geotechnical hazards and unstable including tower footings and access roads in slopes on the centerline route and areas of new road construction or widening on slopes with over 15 percent areas with steep or unstable slopes could create gradient. The engineering geologist will evaluate the nature of the steep slope and/or unstable soil hazard at tower hazardous conditions that may pose a threat of sites with these constraints and the immediate vicinity to allow options for avoiding the hazard. The evaluation disruption to Proposed Project facilities. should be based on an inspection of all sites where towers or roads will be constructed with slopes of 15 percent or greater, or have identified slope instability hazards. Soil testing will be conducted, if needed, to ascertain the depth, lateral extent of unstable materials, and potential hazards both upslope, and down slope of the site. The engineering geologist will prepare a report that includes recommendations for moving the towers or roads, or identifies construction methods to stabilize the site or off-site areas that would threaten the hazard sites if the structures cannot be moved. IID will incorporate the recommendations of the engineering geologist into its COM Plan, including construction drawings and details for grading, drainage, and specialized slope treatment (e.g., installation of retaining walls, wire retention structures, gabions, berms to deflect debris avalanches, etc.). IID's construction contractor will implement the plans, and IID's quality assurance inspectors and the environmental monitors will inspect and certify that the slopes have been constructed and stabilized in accordance with details in the COM Plan. Under no circumstances will cut or fill slopes be allowed to pose a temporary or long-term hazard to the Proposed Project facilities or to off-site property in accordance with criteria set in the COM Plan. All cut slopes will be cut at an angle of repose and/or benched or otherwise protected to ensure long-term stability. IID will commit to appropriate re-contouring, erosion control, and reseeding of all cut-and-fill slopes. IID will also ensure the longterm stability of all slopes. Monitoring and stability requirements will be detailed in the Reclamation section of the COM Plan.

	Table ES-7 Summary of Potentially Significant Environmental Effects			
Impact	Significance Before Mitigation	Mitigation Measures	Significance After Mitigation	
		• To reduce the environmental impacts of slope alteration, all practicable measures will be taken to avoid locating transmission line footings and roads on sites that have severe geotechnical hazards requiring substantial grading and other engineering of cut and fill slopes.		
Geology and Soils Impact 2: Seismic activity in the project area could cause damage to Proposed Project facilities.	S	<ul> <li>Geology and Soils Impact 2 Mitigation:</li> <li>To reduce the hazards of damage from ground rupture, all practicable measures will be taken to avoid sites for transmission towers that are located within known fault zones. Fault zones with a record of historic or Holocene (within the last 10,000 years) fault displacement will be considered capable fault zones. A geotechnical engineering investigation consistent with California geologic and engineering standards will be conducted for the Proposed Project by a licensed geotechnical engineer. The geotechnical engineer will prepare a report that summarizes the results of a field investigation, including site inspection and soil testing, potential geologic hazards (including fault rupture and severe secondary effects of earthquakes), and design criteria and construction methods to effectively construct the Proposed Project with an acceptable level of risk. The report will address all geologic and geotechnical factors related to the design and construction of the Proposed Project. The geotechnical engineering investigation will delineate areas of active and potentially active faults. To the extent possible, it will identify fault traces and locate them in the field so faults can be avoided during tower siting. A more detailed geologic investigation may be necessary in some active and potentially active fault areas if the trace is not sufficiently defined by surface geologic features.</li> <li>All practicable precautions will be taken to design and construction of transmission towers and new substations, substation facility improvements, and equipment to withstand the projected ground shaking associated with the maximum probable earthquake (MPE) in the area. This includes secondary hazards induced by earthquakes (liquefaction, lurching, lateral spreading, rapid differential settlement, induced landslides, and rock-fall avalanche). The MPE represents the strongest earthquake likely to occur over the design life of the Proposed Project. The geotechni</li></ul>		

Table ES-7 Summary of Potentially Significant Environmental Effects			
Impact	Significance Before Mitigation	Mitigation Measures	Significance After Mitigation
Geology and Soils Impact 3: Increased soil compaction and rutting in the transmission line corridor and substations could occur during construction, operation, and maintenance of the Proposed Project.	LS	<ul> <li>Soils Impact 3 itigation: Construction, operation, and maintenance activities will be restricted when the soil is too wet to adequately support construction or maintenance equipment (i.e., when heavy equipment creates ruts in excess of 4 inches deep over a distance of 100 feet or more in wet or saturated soils). This standard will not apply in areas with silty soils, which easily form depressions even in dry weather. Where the soil is deemed too wet, one or more of the following measures will apply:</li> <li>When feasible, reroute all construction or maintenance activities around the wet areas while ensuring that the route does not cross sensitive resource areas.</li> <li>If wet areas cannot be avoided, implement BMPs for use in these areas during construction and improvement of access roads, and their subsequent reclamation. This includes use of wide-track or balloon-tire vehicles and equipment, or other weight dispersing systems approved by the appropriate resource agencies. It also may include use of geotextile cushions, pre-fabricated equipment pads, and other materials to minimize damage to the substrate where determined necessary by resource specialists. If BMPs cannot be successfully applied to wet or saturated soil areas, construction or routine maintenance activities would not be allowed in these areas until the Project environmental monitor(s) determine it is acceptable to proceed.</li> <li>Limit access of construction equipment to the minimum amount feasible, remove and separate topsoil in wet or saturated areas, and stabilize subsurface soils by grading dewater problem areas, utilizing weight dispersion mats, and/or maintaining erosion control measures such as surface drilling and back-dragging. After construction is complete, regrade and recontour the area, replace topsoil, and reseed to achieve the required plant densities.</li> </ul>	LS
Geology and Soils Impact 4: Proposed Project activities on coarse to very coarse textured soils, alkaline/saline soils, or soils with shallow depth to bedrock could delay or reduce reclamation success.	LS	Geology and Soils Impact 4 Mitigation: Vegetation removal and soil disturbances (including temporary road improvements) will be minimized in areas where soil constraints occur. Where vegetation removal is required, mowing or cutting will be the primary method utilized. Plants will generally be cut at a height that results in the least damage to the root crown during cutting or subsequent damage by vehicles and equipment. Blading will be restricted except when required for safe equipment operation (e.g., crane operation on a side hill). Previously located environmental constraint areas will be delineated in the field by a qualified resource specialist prior to construction and included in the COM Plan. These environmental constraint areas will then be avoided by construction activities, or mitigation would be applied consistent with measures described in this EIS/EIR.	LS
Geology and Soils Impact 5: Shrink and swell actions of expansive soils could damage equipment foundations.	S	Geology and Soils Impact 5 Mitigation: Prior to construction, soils will be evaluated to determine if they are expansive and if they may have potential effects on the proposed facilities. Where they represent a potential hazard, solutions recommended by the Proposed Project's geotechnical engineer, such as excavation and replacement of the expansive soils with compacted backfill, will be required. If imported backfill material is used, it will be certified to be free of noxious weeds and propagates (i.e., seeds and root fragments).	LS

	Table ES-7 Summary of Potentially Significant Environmental Effects			
Impact	Significance Before	Mitigation Measures	Significance After Mitigation	
Geology and Soils Impact 6: Ground disturbance and vegetation removal during construction could result in increase soils erosion.		Geology and Soils Impact 6 Mitigation: Short-term erosion and sedimentation will be reduced, and topography and vegetation will be quickly restored, as practicable, to pre-construction conditions in all areas required and approved by BLM and private landowners.  A qualified resource specialist will monitor implementation during construction and operations, until successful revegetation is achieved. Monitoring of the erosion control measures will continue until reclamation efforts were considered complete and successful. Measures to be implemented by the Proposed Project proponent during Proposed Project construction and reclamation are listed below.  Implementation of the following environmental protection practices will minimize the effects of grading, excavation, and other surface disturbances in all project areas. Schedules and specifications on the use of these features would be included in the COM Plan.  • Confine all vehicular traffic associated with construction to designated right-of-ways, material yards, wire set-up sites, and access roads designated in the COM Plan.  • Limit disturbance/removal of soils and vegetation to the minimum area necessary for access and construction.  • Where vegetation removal is necessary, use cutting/mowing methods instead of blading, wherever possible, as described in Soils Mitigation Measure 2.  • Adhere to a construction methodology that mitigates impacts to less than significant levels in sensitive areas during severe weather events.  • Inform all construction personnel before they are allowed to work on the Proposed Project of environmental concerns, pertinent laws and regulations, and elements of the erosion control plan. This could be presented in a multi-hour environmental training for project management and general foremen, and a short (one hour or less) environmental training class for construction personnel.	After	
		<ul> <li>Minimize grading to the extent possible. When required, grading will be conducted away from watercourses/washes to reduce the potential of material entering the watercourse.</li> <li>Slope and berm graded material, where possible, to reduce surface water flows across the graded area.</li> <li>Replace excavated materials in disturbed areas and minimize the time between excavation and backfilling.</li> <li>Direct the dewatering of excavations onto stable surfaces to avoid soil erosion.</li> <li>Use detention basins, certified weed-free straw bales, or silt fences, where appropriate.</li> <li>Use drainage control structures, where necessary, to direct surface drainage away from disturbance areas and to minimize runoff and sediment deposition downslope from all disturbed areas. These structures include culverts, ditches, water bars (berms and cross ditches), and sediment traps.</li> <li>Implement other applicable BMPs to minimize erosion-related impacts during construction and improvement of access roads, and their subsequent reclamation.</li> <li>Re-establish native and, if necessary, non-persistent, non-invasive, non-native vegetation cover in highly erodible areas as quickly as possible following construction.</li> </ul>		

	Sumr	Table ES-7 mary of Potentially Significant Environmental Effects	
Impact	Significance Before Mitigation		Significance After Mitigation
		In areas of highly erodible soils, non-standard construction equipment and techniques that minimize surface disturbance, soil compaction, and loss of topsoil will be used, such as vehicles with low ground pressure tires. Vegetation clearing will be minimized. Temporary erosion control measures, in accordance with the COM Plan, will be in place before construction is allowed to proceed in potential soil erosion areas (e.g., steep slope areas). Erodible slopes that do not require grading will be cleared using equipment that results in little to no soil disturbance.	
ALTERNATIVE A			•
		nilar to these identified above the Proposed Project, and mitigation measures identified for the Proposed Project would also e expected to be sufficient to reduce potentially significant impacts to a less than significant level.	o be
Geology and soils impacts associated with Alternappropriate for Alternative B impacts. Mitigation		nilar to these identified above the Proposed Project, and mitigation measures identified for the Proposed Project would also e expected to be sufficient to reduce potentially significant impacts to a less than significant level.	o be
ALTERNATIVE C			
		nilar to these identified above the Proposed Project, and mitigation measures identified for the Proposed Project would also e expected to be sufficient to reduce potentially significant impacts to a less than significant level.	o be
		Section 3.6 – Visual Resources	
PROPOSED PROJECT			T 10
Visual Resources Impact 1: Potential visual impacts during construction	S	<ul> <li>Visual Resources Impact 1Mitigation:</li> <li>After Project construction is complete, ground surfaces within the transmission line right-of-way and areas outside the right-of-way that are disturbed during project construction would be restored to their original condition and grade, as outlined in the Reclamation Plan.</li> <li>Staging areas would be revegetated as necessary, pursuant to the Reclamation Plan.</li> <li>Topographic features and landforms would be used to screen the spur roads where feasible.</li> <li>Existing rock formations and vegetation would be retained whenever possible.</li> <li>Construct access roads and the spur roads at appropriate angles from the originating primary travel route to minimize extended, in-line views of newly graded terrain. This mitigation is dependent upon the ability to safely construct, maintain, and utilize the road/route.</li> </ul>	
Visual Resources Impact 2:	S	Visual Resources Impact 2 Mitigation:	LS
Conflicts with BLM VRM goals and objectives		<ul> <li>Establish limits of disturbance that reflect the minimum area required for construction.</li> <li>Finish transmission structures with flat, neutral gray tones that would relate to the colors of the structures in the existing transmission corridors and would blend with the surrounding environment.</li> <li>Use nonspecular conductors, and nonreflective and nonrefractive insulators to reduce conductor and insulator visibility.</li> </ul>	
ALTERNATIVE A			1
		ilar to these identified above the Proposed Project, and mitigation measures identified for the Proposed Project would also	be
appropriate for Atternative A impacts. Mitigatio	n measures ar	e expected to be sufficient to reduce potentially significant impacts to a less than significant level.	

Table ES-7 Summary of Potentially Significant Environmental Effects			
Impact	Significance Before Mitigation	Mitigation Measures	Significance After Mitigation
ALTERNATIVE B			
Visual Resources Impact B1: Potential visual impacts during construction	S	<u>Visual Resources Impact B1 Mitigation:</u> Mitigation measure for Alternative B would be similar to those identified for the Proposed Project.	LS
Visual Resources Impact B2: Conflicts with VRM System Goals and Objectives	S	Visual Resources Impact B2 Mitigation: Mitigation measure for Alternative B would be similar to those identified for the Proposed Project.	LS
ALTERNATIVE C			I
Visual resources impacts associated with Alterna		ilar to these identified above the Proposed Project, and mitigation measures identified for the Proposed Project would also e expected to be sufficient to reduce potentially significant impacts to a less than significant level.	be
The state of the s		Section 3.7 – Land Use	
PROPOSED PROJECT			
Land Use Impact 1 Elements of the Proposed Project is not consistent with applicable land use plans, zoning ordinances, or applicable habitat conservation plan or natural community conservation plan.		Not Required	LS
Land Use Impact 2: The Proposed Project could convert Prime Farmland, Unique Farmland, Farmland of Statewide Importance, or Farmland of Local Importance (Important Farmland) to non- agricultural use.	LS	Not Required	LS
ALTERNATIVE A			
Land Use Impact A1: Elements of Option A-2 may be inconsistent with applicable land use plans, zoning ordinances, or applicable habitat conservation plan or natural community conservation plan.		Not required.	LS
Land Use Impact A2: Option A-2 would potentially convert Prime Farmland, Unique Farmland, Farmland of Statewide Importance, or Farmland of Local Importance (Important Farmland) to non- agricultural use.	LS	Not required.	LS

Table ES-7 Summary of Potentially Significant Environmental Effects			
Impact	Significance Before Mitigation	Mitigation Measures	Significance After Mitigation
ALTERNATIVE B			
Land Use Impact B1:  Elements of Alternative B may be inconsistent with applicable land use plans, zoning ordinances, or applicable habitat conservation plan or natural community conservation plan.	S	<u>Land Use Impact B1 Mitigation:</u> Amend the CDCA Plan, and obtain a General Plan Exemption and Zoning Variance from Imperial County.	LS
Land Use Impact B2: Alternative B would potentially convert Prime Farmland, Unique Farmland, Farmland of Statewide Importance, or Farmland of Local Importance (Important Farmland) to non- agricultural use. ALTERNATIVE C	LS	Not required.	LS
Land Use Impact C1:  Elements of Alternative C may be inconsistent with applicable land use plans, zoning ordinances, or applicable habitat conservation plan or natural community conservation plan.	LS	Not required.	LS
Land Use Impact C2: Alternative C would potentially convert Prime Farmland, Unique Farmland, Farmland of Statewide Importance, or Farmland of Local Importance (Important Farmland) to non- agricultural use.	LS	Not required.	LS
		Section 3.8 – Socioeconomics	
PROPOSED PROJECT			
Socioeconomic Impact 1 Construction and operation of the Proposed Project would increase employment in the project area.	LS	Not required.	LS
Socioeconomic Impact 2 Construction and operation of the Proposed Project would increase the population in the project area.	LS	Not required.	LS

Table ES-7 Summary of Potentially Significant Environmental Effects			
Impact	Significance Before Mitigation	Mitigation Measures	Significance After Mitigation
Socioeconomic Impact 3 Construction and operation of the Proposed Project would increase the demand for housing in the project area.	LS	Not required.	LS
Socioeconomic Impact 4 Construction of the Proposed Project would result in positive short-term impacts on the local economy in Riverside and Imperial Counties.	LS	Not required.	LS
Socioeconomic Impact 5 Construction of the Proposed Project would result in positive short-term impacts on fiscal resources of local governments in the project area.	LS	Not required.	LS
Socioeconomic Impact 6 Construction and operation of the Proposed Project would impact public facilities and services in the project area.	LS	Not required.	LS
Socioeconomic Impact 7 Potential environmental justice impacts associated with the Proposed Project.	LS	Not required.	LS
for Alternative A impacts. Mitigation measures at ALTERNATIVE B Socioeconomic impacts associated with Alternative for Alternative B impacts. Mitigation measures at	re expected to ve B are simil	ar to these identified above the Proposed Project, and mitigation measures identified for the Proposed Project would also be be sufficient to reduce potentially significant impacts to a less than significant level.  ar to these identified above the Proposed Project, and mitigation measures identified for the Proposed Project would also be be sufficient to reduce potentially significant impacts to a less than significant level.	
		ar to these identified above the Proposed Project, and mitigation measures identified for the Proposed Project would also b b be sufficient to reduce potentially significant impacts to a less than significant level.	e appropriate
PROPOSED PROJECT		Section 3.9 – Noise	
Noise Impact 1: Noise generated during construction of project facilities could result in temporary increases in noise levels at sensitive receptors.	LS	<ul> <li>Noise Impact 1 Mitigation:         <ul> <li>Construction occurring within 0.5 miles of a residential dwelling or designated campground shall be limited to a Monday through Friday work schedule of 7:00 a.m. to 7:00 p.m. to reduce sleep interference.</li> </ul> </li> <li>Construction equipment shall be equipped with manufacturer recommended mufflers or equivalent.</li> <li>Construction equipment shall be turned off when not in operation.</li> </ul>	LS

		Table ES-7	
	Sumr	mary of Potentially Significant Environmental Effects	
Impact	Significance Before Mitigation	Mitigation Measures	Significance After Mitigation
Noise Impact 2: Blasting that may be necessary during Transmission line construction could create a nuisance at sensitive receptors within proximity to such activities.	LS	<ul> <li>Noise Impact 2 Mitigation:</li> <li>Blasting during construction would only be conducted when other practicable excavation methods are not available.</li> <li>In the event that blasting is necessary, it would be conducted only during the hours of 7:00 a.m. to 5:00 p.m., Monday through Friday.</li> <li>Sensitive receptors within areas in which noise from blasting would be greater than ten dB would be provided advance notification of the date and time of any blasting activities.</li> <li>In the event that blasting is necessary, a Blasting Plan would be developed and approved by the BLM and the project proponents.</li> </ul>	LS
Noise Impact 3: Operational noise would include noise emitted by project facilities, such as humming and hissing, and noise from activities associated with maintenance. These noise levels would be low and of short duration in the case of operational noise and noise resulting from maintenance activities. These activities are not expected to adversely affect sensitive receptors.	LS	Not Required	LS
		e identified above the Proposed Project, and mitigation measures identified for the Proposed Project would also be appropr sufficient to reduce potentially significant impacts to a less than significant level.	iate for
Noise impacts associated with Alternative B are s Alternative B impacts. Mitigation measures are e ALTERNATIVE C	expected to be	se identified above the Proposed Project, and mitigation measures identified for the Proposed Project would also be approp sufficient to reduce potentially significant impacts to a less than significant level.	
		e identified above the Proposed Project, and mitigation measures identified for the Proposed Project would also be appropr sufficient to reduce potentially significant impacts to a less than significant level.	iate for
		Section 3.10 – Traffic and Transportation	
PROPOSED PROJECT  Traffic and Transportation Impact 1:  Vehicle trips for personnel and equipment movement during construction and operation of the Proposed Project would increase traffic volumes on area roadways.	LS	Not Required	LS

Table ES-7 Summary of Potentially Significant Environmental Effects			
Impact	Significance Before Mitigation		Significance After Mitigation
Traffic and Transportation Impact 2: Construction activities in proximity to public roadways could create traffic delays and unsafe conditions for motorists.	LS	<u>Traffic Impact 2 Mitigation</u> : Traffic controls would be implemented at locations of ingress and egress of construction vehicles on public roadways as necessary to ensure that safe driving conditions are maintained.	LS
Traffic and Transportation Impact 3: Construction activities could result in damage to local roadways.	LS	<u>Traffic Impact 3 Mitigation</u> : Following construction, or during construction as necessary to maintain safe driving conditions, any damage to existing roadways caused by construction vehicles would be repaired.	LS
Traffic and Transportation Impact 4: Construction activities and the presence of the Proposed Project transmission line in proximity to airports could disrupt operation of these facilities.	LS	Not Required	LS
ALTERNATIVE A	1		
		A are similar to these identified above the Proposed Project, and mitigation measures identified for the Proposed Project w e expected to be sufficient to reduce potentially significant impacts to a less than significant level.	ould also be
Traffic and Transportation Impact B1: Construction activities in the proximity of SR 78 could create traffic delays and unsafe conditions for motorists.	LS	<u>Traffic and Transportation Impact B1 Mitigation</u> : Traffic controls would be implemented at locations of ingress and egress of construction vehicles on SR 78, as necessary, to ensure that safe driving conditions are maintained.	LS
Traffic and Transportation Impact B2: Construction activities could result in damage to SR 78 and other local roadways.	LS	<u>Traffic and Transportation Impact B2 Mitigation</u> : Following construction, or during construction as necessary to maintain safe driving conditions, any damage to existing roadways caused by construction vehicles would be repaired	LS
		C are similar to these identified above the Proposed Project, and mitigation measures identified for the Proposed Project w e expected to be sufficient to reduce potentially significant impacts to a less than significant level. Section 3.11 – Public Health and Safety	ould also be
PROPOSED PROJECT		· · · · · · · · · · · · · · · · · · ·	
Health and Safety Impact 1: Use of hazardous materials for construction, operation and maintenance of the Proposed Project would create potential exposure for workers and the public.	LS	Not Required	LS

Significance After Mitigation LS

LS

Table ES-7 Summary of Potentially Significant Environmental Effects				
Impact	Significance Before Mitigation	Mitigation Measures		
Health and Safety Impact 2: Construction activities would generate solid wastes requiring disposal.	LS	Not Required		
Health and Safety Impact 3: Activities associated with construction, operation and maintenance of the Proposed	S	Health and Safety Impact 3 Mitigation: IID would implement a FPRP during construction, operation, and maintenance of the proposed transmission line. A detailed plan would be prepared as part of the COM Plan. A preliminary outline of the Fire Prevention and Response Plan (FPRP) is provided with this EIS/EIR as Appendix H, and		

hazards associated with the Proposed Project.

Health and Safety Impact 4:	LS	Not Required	LS
Transportation and use of materials necessary			
for potential blasting could create an increased			
risk of injury to workers and the public.			
Public Health and Safety Impact 5:	LS	Not Required	LS
The energized transmission line would increase			
potential for accidental fire ignition.			
Health and Safety Impact 6:	LS	Not Required	LS
Substation equipment and the energized			
transmission line could increase EMF levels			
within and in areas immediately adjacent to the			
right-of-way.			
Health and Safety Impact 7:	S	Health and Safety Impact 7 Mitigation: Prior to energizing the Proposed Project transmission line, IID would consult	LS
Energized transmission line would create risk of		with managers of agricultural land within the transmission line right-of-way to ensure that irrigation practices would	
electric shock within the transmission line right-		not create a potential for water stream contact with overhead transmission lines. This mitigation measure would reduce	

includes some of the basic practices and techniques that would be included in the final FPRP, and used to minimize fire

## line right-of-way. ALTERNATIVE A

of-way.

fire ignition.

Health and safety impacts associated with Alternative A are similar to those identified above the Proposed Project, and mitigation measures identified for the Proposed Project would also be appropriate for Alternative A impacts. Mitigation measures are expected to be sufficient to reduce potentially significant impacts to a less than significant level.

Health and Safety Impact 7 to less than significant.

LS

Not Required

## ALTERNATIVE B

## **Health and Safety Impact B1:**

**Health and Safety Impact 8:** 

Energized transmission line would create potential disruption to pacemaker operation within and immediately adjacent to transmission

Substation equipment and the energized transmission line could increase EMF levels within and in areas immediately adjacent to right-of-way. However, potentially significant health and safety impacts associated with Alternative A similar to these identified above the Proposed Project, and mitigation measures identified for the Proposed Project would also be appropriate for Alternative A impacts. Mitigation measures are expected to be sufficient to reduce potentially significant impacts to a less than significant level.

Project would increase potential for accidental

LS

ALTERNATIVE C  Health and Safety Impact C1:  Substation equipment and the energized transmission line could increase EMF levels within and in areas immediately adjacent to right-of-way. However, potentially significant health and safety impacts associated with Alternative A similar to these identified above the Proposed Project, and mitigation measures identified for the Proposed Project would also be appropriate for Alternative A impacts. Mitigation measures are expected to be sufficient to reduce potentially significant impacts to a less than significant level.  Section 3.12 - Paleontology  PROPOSED PROJECT  Paleontological Resources Impact 1:  Excavation in conjunction with development of the Proposed Project has a high potential to adversely impact significant paleontologic resources. This mitigation program will be consistent with the provisions of CEQA, regulations currently implemented by Riverside and Imperial Counties, and proposed guidelines of the Society of Vertebrate Paleontology. This program will include, but not be limited to:  • Pre-construction survey of the length of the Proposed Project alignment to confirm and/or augment geologic mapping, to further assess the paleontologic potential of the geologic formations described herein (particularly those having undetermined paleontologic sensitivity), to recover exposed paleontologic resources as necessary, and to determine where historic or recent disturbances might have reduced or climinated the paleontologic sensitivity of a given rock unit.  • Monitoring, by a qualified paleontologic monitor, of excavation in areas identified as having high or undetermined potential to contain paleontologic resources. The monitor should be equipped to salvage fossils as they are unearthed, to avoid construction delays and to remove samples of sediments that are likely to contain the remains of small fossil invertebrates and vertebrates. The monitor must be empowered to temporarily halt or divert equipment to allow removal of abundant or large specimens. Monitor	Table ES-7						
ALTERNATIVE C  Health and Safety Impact CI:  House the proposed project has a high potential to adversely impact significant paleontologic resources.  Section 3.12 - Paleontologic Proposed Project has a high potential to adversely impact significant paleontologic resources. This mitigation program will be consistent with the provisions of CEQA, regulations currently implemented by Riverside and Imperial Counties, and proposed guidelines of the Society of Vertebrate Paleontology:  Proposed Project has a high potential to adversely impact significant paleontologic resources. This mitigation program will be consistent with the provisions of CEQA, regulations currently implemented by Riverside and Imperial Counties, and proposed guidelines of the Society of Vertebrate Paleontology. This program will include, but not be limited to:  **Nontroning** by a qualified paleontologic resources. The monitor should be equipped to salvage fossils as they are uncarthed, to avoid construction delays and to remove samples of sediments that are likely to contain the remains of small fossil invertebrates and vertebrates. The monitor must be empowered to temporarily halt or divert equipment to allow removal of abundant or large specimens. Monitoring may be reduced if the potentially fossiliferous units described herein are not present at the surface or in the subsurface, or if present are determined upon exposure and examination by qualified paleontologic resounces to make the proposed project to contain the remains of small fossil invertebrates and vertebrates.  **Preparation of recovered specimens to a point of identification and permanent preservation, including washing of sediments to contain fossil resources.  **Preparation of recovered specimens into a museum repository with permanent retrievable storage. The paleontologic should have a written repository agreement in hand prior to the initiation of mitigation activities.  **Preparation of a report of findings with an appended itemized inventory of specimens. The report and in		Summary of Potentially Significant Environmental Effects					
Health and Safety Impact CI:   Substation equipment and the energized transmission line could increase EMF levels within and in areas immediately adjacent to right-of-way. However, potentially significant health and safety impacts associated with Alternative A similar to these identified above the Proposed Project, and mitigation measures identified for the Proposed Project would also be appropriate for Alternative A impacts. Mitigation measures are expected to be sufficient to reduce potentially significant impacts to a less than significant level.    PROPOSED PROJECT   Paleontological Resources Impact I:   Securation in conjunction with development of the Proposed Project has a high potential to adversely impact significant paleontologic resources. This mitigation program will be consistent with the provisions of CEQ4, regulations currently implemented by Riverside and Imperial Counties, and proposed guidelines of the Society of Vertebrate Paleontology. This program will include, but not be limited to:		Before	Mitigation Measures	Significance After Mitigation			
Substation equipment and the energized transmission line could increase EMF levels within and in areas immediately adjacent to right-of-way. However, potentially significant health and safety impacts associated with Alternative A similar to these identified above the Proposed Project, and mitigation measures identified for the Proposed Project would also be appropriate for Alternative A impacts. Mitigation measures are expected to be sufficient to reduce potentially significant impacts to a less than significant level.    Paleontological Resources Impact 1:   Excavation in conjunction with development of the Proposed Project has a high potential to adversely impact significant paleontologic resources. This mitigation program will be consistent with the provisions of CEQA, regulations currently implemented by Riverside and Imperial Counties, and proposed guidelines of the Society of Vertebrate Paleontology. This program will include, but not be limited to:    Pre-construction survey of the length of the Proposed Project alignment to confirm and/or augment geologic mapping, to further assess the paleontologic potential of the geologic formations described herein (particularly those having undetermined paleontologic potential of the geologic formations described herein particularly those having undetermined paleontologic potential of the ordered potential to contain paleontologic potential of the geologic formations described herein particularly those having undetermined paleontologic potential of the geologic formations described herein particularly those having undetermined paleontologic potential of the geologic formations described herein in particularly those having undetermined paleontologic potential or contain paleontologic resources an encessary, and to determine where historic or recovir disturbances might have reduced or eliminated the paleontologic sensitivity of a given rock unit.    Monitoring, by a qualified paleontologic monitor, of excavation in areas identified as having high or undetermined pote	ALTERNATIVE C						
PROPOSED PROJECT  Paleontological Resources Impact 1:  Excavation in conjunction with development of the Proposed Project has a high potential to adversely impact significant paleontologic resources. This mitigation program will be consistent with the provisions of CEQA, regulations currently implemented by Riverside and Imperial Counties, and proposed guidelines of the Society of Vertebrate Paleontology. This program will include, but not be limited to:  Pre-construction survey of the length of the Proposed Project alignment to confirm and/or augment geologic mapping, to further assess the paleontologic sensitivity), to recover exposed paleontologic resources as necessary, and to determine where historic or recent disturbances might have reduced or eliminated the paleontologic sensitivity of a given rock unit.  Monitoring, by a qualified paleontologic monitor, of excavation in areas identified as having high or undetermined potential to contain paleontologic resources. The monitor should be equipped to salvage fossils as they are unearthed, to avoid construction delays and to remove samples of sediments that are likely to contain the remains of small fossil invertebrates and vertebrates. The monitor must be empowered to temporarily halt or divert equipment to allow removal of abundant or large specimens. Monitoring may be reduced if the potentially fossiliferous units described herein are not present at the surface or in the subsurface, or if present are determined upon exposure and examination by qualified paleontologic personnel to have low potential to contain fossil resources.  Preparation of recovered specimens to a point of identification and permanent preservation, including washing of sediments to recover small invertebrates and vertebrates.  Identification and curation of specimens into a museum repository with permanent retrievable storage. The paleontologist should have a written repository agreement in hand prior to the initiation of mitigation activities.  Preparation of a report of findings with	Substation equipment and the energized transmiss impacts associated with Alternative A similar to the	ese identified	d above the Proposed Project, and mitigation measures identified for the Proposed Project would also be appropriate for A				
Paleontological Resources Impact 1:  Excavation in conjunction with development of the Proposed Project has a high potential to adversely impact significant paleontologic resources.  S  Paleontological Impact 1 Mitigation: A qualified vertebrate paleontologist will develop a program to mitigate impacts to nonrenewable paleontologic resources. This mitigation program will be consistent with the provisions of CEQA, regulations currently implemented by Riverside and Imperial Counties, and proposed guidelines of the Society of Vertebrate Paleontology. This program will include, but not be limited to:  • Pre-construction survey of the length of the Proposed Project alignment to confirm and/or augment geologic mapping, to further assess the paleontologic potential of the geologic formations described herein (particularly those having undetermined paleontologic sensitivity), to recover exposed paleontologic resources as necessary, and to determine where historic or recent disturbances might have reduced or eliminated the paleontologic sensitivity of a given rock unit.  • Monitoring, by a qualified paleontologic monitor, of excavation in areas identified as having high or undetermined potential to contain paleontologic resources. The monitor should be equipped to salvage fossils as they are unearthed, to avoid construction delays and to remove samples of sediments that are likely to contain the remains of small fossil invertebrates and vertebrates. The monitor must be empowered to temporarily halt or divert equipment to allow removal of abundant or large specimens. Monitoring may be reduced if the potentially fossiliferous units described herein are not present at the surface or in the subsurface, or if present are determined upon exposure and examination by qualified paleontologic personnel to have low potential to contain fossil resources.  • Preparation of recovered specimens to a point of identification and permanent preservation, including washing of sediments to recovered specimens into a museum repository with p							
Excavation in conjunction with development of the Proposed Project has a high potential to adversely impact significant paleontologic resources.  **This mitigation program will be consistent with the provisions of CEQA, regulations currently implemented by Riverside and Imperial Counties, and proposed guidelines of the Society of Vertebrate Paleontology. This program will include, but not be limited to:  **Pre-construction survey of the length of the Proposed Project alignment to confirm and/or augment geologic mapping, to further assess the paleontologic potential of the geologic formations described herein (particularly those having undetermined paleontologic sensitivity), to recover exposed paleontologic resources as necessary, and to determine where historic or recent disturbances might have reduced or eliminated the paleontologic sensitivity of a given rock unit.  **Monitoring, by a qualified paleontologic monitor, of excavation in areas identified as having high or undetermined potential to contain paleontologic resources. The monitor should be equipped to salvage fossils as they are unearthed, to avoid construction delays and to remove samples of sediments that are likely to contain the remains of small fossil invertebrates and vertebrates. The monitor must be empowered to temporarily halt or divert equipment to allow removal of abundant or large specimens. Monitoring may be reduced if the potentially fossiliferous units described herein are not present at the surface or in the subsurface, or if present are determined upon exposure and examination by qualified paleontologic personnel to have low potential to contain fossil resources.  **Preparation of recovered specimens to a point of identification and permanent preservation, including washing of sediments to recover small invertebrates and vertebrates.  **Preparation of recovered specimens into a museum repository with permanent retrievable storage. The paleontologist should have a written repository agreement in hand prior to the initiation of mitigat		,					
paleontologic resources.  ALTERNATIVE A	Excavation in conjunction with development of the Proposed Project has a high potential to adversely impact significant paleontologic resources.	S	<ul> <li>to nonrenewable paleontologic resources. This mitigation program will be consistent with the provisions of CEQA, regulations currently implemented by Riverside and Imperial Counties, and proposed guidelines of the Society of Vertebrate Paleontology. This program will include, but not be limited to:         <ul> <li>Pre-construction survey of the length of the Proposed Project alignment to confirm and/or augment geologic mapping, to further assess the paleontologic potential of the geologic formations described herein (particularly those having undetermined paleontologic sensitivity), to recover exposed paleontologic resources as necessary, and to determine where historic or recent disturbances might have reduced or eliminated the paleontologic sensitivity of a given rock unit.</li> <li>Monitoring, by a qualified paleontologic monitor, of excavation in areas identified as having high or undetermined potential to contain paleontologic resources. The monitor should be equipped to salvage fossils as they are unearthed, to avoid construction delays and to remove samples of sediments that are likely to contain the remains of small fossil invertebrates and vertebrates. The monitor must be empowered to temporarily halt or divert equipment to allow removal of abundant or large specimens. Monitoring may be reduced if the potentially fossiliferous units described herein are not present at the surface or in the subsurface, or if present are determined upon exposure and examination by qualified paleontologic personnel to have low potential to contain fossil resources.</li> <li>Preparation of recovered specimens to a point of identification and permanent preservation, including washing of sediments to recover small invertebrates and vertebrates.</li> <li>Identification and curation of specimens into a museum repository with permanent retrievable storage. The paleontologist should have a written repository agreement in hand prior to the initiation of mitigation acti</li></ul></li></ul>				

Paleontological resources impacts associated with Alternative A are similar to these identified above the Proposed Project, and mitigation measures identified for the Proposed Project would also be appropriate for Alternative A impacts. Mitigation measures are expected to be sufficient to reduce potentially significant impacts to a less than significant level.

# ALTERNATIVE B

Paleontological resources impacts associated with Alternative B are similar to these identified above the Proposed Project, and mitigation measures identified for the Proposed Project would also be appropriate for Alternative B impacts. Mitigation measures are expected to be sufficient to reduce potentially significant impacts to a less than significant level.

Table ES-7						
Summary of Potentially Significant Environmental Effects						
Impact	Significance Before Mitigation	Mitigation Measures	Significance After Mitigation			
ALTERNATIVE C						
		C are similar to these identified above the Proposed Project, and mitigation measures identified for the Proposed Project very expected to be sufficient to reduce potentially significant impacts to a less than significant level.  Section 3.13 – Wilderness and Recreation	vould also be			
PROPOSED PROJECT		SCOULD THE WATER AND				
Wilderness and Recreation Impact 1: Temporary construction impacts could result in the reduction in wilderness and recreational quality.	LS	Not Required	LS			
Wilderness and Recreation Impact 2: Construction activity could reduce access and visitation to wilderness and recreation areas during construction.	LS	Not Required	LS			
ALTERNATIVE A			_			
Wilderness and Recreation Impact A1: A new transmission line may result in the reduction of wilderness quality.	LS	Not Required	LS			
Wilderness and Recreation Impact A2: Construction activity may result in the reduction in access and visitation to wilderness and recreation areas during construction.	LS	Not Required	LS			
ALTERNATIVE B  Wilderness and Recreation Impact B1: Construction activity may result in the reduction	LS	Not Required	LS			
of wilderness quality  Wilderness and Recreation Impact B2: Construction activity may result in the reduction in access and visitation to wilderness and recreation areas during construction.	LS	Not Required	LS			

Table ES-7 Summary of Potentially Significant Environmental Effects					
Impact	Significance Before Mitigation	Mitigation Measures	Significance After Mitigation		
ALTERNATIVE C					
Wilderness and Recreation Impact C1:	LS	Not Required	LS		
The addition of a new transmission line may					
result in the reduction of wilderness quality.					
Wilderness and Recreation Impact C2:	LS	Not Required	LS		
Construction activity may result in the reduction					
in access and visitation to wilderness and					
recreation areas during construction.					

S = Significant; LS = Less than Significant; SU = Significant Unavoidable

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